

Amendments to the Claims:

The following Listing of Claims replaces all prior versions and listings of the claims in this application.

Listing of the Claims

1. (Currently Amended) An oligonucleotide structure comprising a first strand of nucleic acid and a second strand of nucleic acid, the first and second strands being hybridized to each other in a duplex section, and at least two hydrophobic anchoring moieties capable of being attached to a lipid membrane, wherein a terminal end of the first strand is not part of the duplex section and is free from a hydrophobic moiety and wherein the hydrophobic anchoring moieties are covalently attached to adjacent terminal ends of the first and second strands, respectively.

2. – 4. (Cancelled).

5. (Currently Amended) An oligonucleotide structure according to claim 1, ~~3~~ comprising ~~n additional strands; n being an integer and $n > 0$; at least one additional strand,~~ wherein ~~the additional strands are each~~ additional strand is provided with a terminal hydrophobic anchoring moiety, wherein a first additional strand is hybridized to said second strand and wherein a any second or greater additional strand is hybridized to the first preceding additional strand and ~~strand n is hybridized to strand n-1.~~

6. (Currently Amended) An oligonucleotide structure according to claim 1, ~~2~~ comprising ~~a first and a second strand said~~ wherein the two strands are being hybridized to each

other in the a duplex region in a manner that leaves the first strand free to hybridize with a third strand.

7. (Currently Amended) An oligonucleotide structure according to claim 6, wherein said ~~first~~ second strand has hydrophobic anchoring moieties in both terminal ends.

8. (Currently Amended) An oligonucleotide structure according to claim 7, wherein said third strand has a terminal hydrophobic anchoring moiety so first and third strands have adjacent hydrophobic anchoring moieties.

9. (Currently Amended) An oligonucleotide structure according to claim 1, wherein the hydrophobic anchoring moieties are ~~moiety is~~ selected among steroids, fatty acids, hydrophobic peptides and lipids.

10. (Currently Amended) An oligonucleotide structure according to claim 9, wherein the hydrophobic anchoring moieties are ~~moiety is~~ cholesterol or a derivative thereof.

11. (Currently Amended) An oligonucleotide structure according to claim 1 ~~3~~, wherein the each hydrophobic anchoring moiety is spaced apart from the duplex section by a spacing group or a sufficient number of non-hybridized nucleic acid units.

12. (Currently Amended) An oligonucleotide structure according to claim 1 adapted and available to be linked by specific binding to a surface immobilized linker or to another lipid membrane attached linker.

13. (Currently Amended) An oligonucleotide structure according to claim 1 immobilized to a surface.

14. (Currently Amended) An oligonucleotide structure according to claim 1 2, wherein the first strand is longer than the second strand, and said first and second strands have a duplex region involving the terminal end of the second strand.

15. (Currently Amended) An oligonucleotide structure according to claim 8, wherein the first strand has essentially double the amount of nucleic acid monomers than the second strand, and said first and second ~~strand~~ strands each have a cholesterol molecule attached to their free 5' and 3'-ends, respectively.

16. (Currently Amended) An oligonucleotide structure according to claim 1 comprising a section of peptide nucleic acids (PNA) capable of forming PNA-peptide complexes.

17. (Currently Amended) An oligonucleotide structure according to claim 9, wherein the first strand is 30-mer DNA; and the second strand is a 15-mer DNA having 12 complementary bases.

18. (Withdrawn and Currently Amended) A lipid vesicle comprising an oligonucleotide structure according to claim 1 attached to its lipid membrane.

19. (Withdrawn) A lipid vesicle according to claim 18 comprising electrochemically detectable reporter molecules.

20. (Withdrawn) A lipid vesicle according to claim 18 comprising biologically active compounds exhibiting biological functionality.

21. (Withdrawn) A lipid vesicle according to claim 20, wherein said biologically active compound is a membrane protein.

22. (Withdrawn and Currently Amended) A surface immobilized structure comprising a plurality of vesicles according to claim 18, wherein said vesicles are adapted and available to be linked by specific binding to any of a surface immobilized linker, another lipid vesicle attached linker or a surface immobilized oligonucleotide structure comprising at least two hydrophobic anchoring moieties capable of being attached to a lipid membrane.

23. (Withdrawn and Currently Amended) A biosensor including a surface immobilized oligonucleotide structure according to claim 13.

24. (Withdrawn and Currently Amended) A method of forming a lipid membrane attached linker, ~~wherein comprising contacting~~ an oligonucleotide structure according to claim 1 having two or more hydrophobic anchoring moieties with ~~contacts~~ a lipid membrane, thereby accomplishing a direct attachment of said oligonucleotide structure by said moieties at adjacent sites on the same membrane.

25. (Withdrawn) A method according to claim 24, wherein said membrane forms a lipid vesicle.

26. (Withdrawn) A method according to claim 24 wherein said membrane is a bilayer membrane.

27. (Withdrawn) A method according to claim 24, wherein said attachment is irreversible.